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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|-------------------------|------------------|
| 10/079,365 | 02/21/2002 | Frederick Bernhardt | COMFORT-6 | 7712 |
| 7590 10/05/2004 STEPHEN P. GILMARTIN 6640 BRIGHTWATER TRAIL | | | EXAMINER | |
| | | | MAKI, STEVEN D | |
| LITTLETON, CO 80125 | | | ART UNIT | PAPER NUMBER |
| | | | 1733 | |
| | | | DATE MAILED: 10/05/2004 | |

Please find below and/or attached an Office communication concerning this application or proceeding.

| | Application No. | Applicant(s) | | | | |
|--|--|--|--|--|--|--|
| | 10/079,365 | BERNHARDT, FREDERICK | | | | |
| Office Action Summary | Examiner | Art Unit | | | | |
| | Steven D. Maki | 1733 | | | | |
| The MAILING DATE of this communication a Period for Reply | appears on the cover sheet w | th the correspondence address | | | | |
| A SHORTENED STATUTORY PERIOD FOR REF THE MAILING DATE OF THIS COMMUNICATION - Extensions of time may be available under the provisions of 37 CFR after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a r If NO period for reply is specified above, the maximum statutory perion. Failure to reply within the set or extended period for reply will, by state Any reply received by the Office later than three months after the mate arned patent term adjustment. See 37 CFR 1.704(b). | N. 1.136(a). In no event, however, may a r eply within the statutory minimum of third od will apply and will expire SIX (6) MON | y (30) days will be considered timely. THS from the mailing also of this communication. | | | | |
| Status | | | | | | |
| 1) Responsive to communication(s) filed on | | | | | | |
| _ | nis action is non-final. | | | | | |
| 3) Since this application is in condition for allow | | | | | | |
| closed in accordance with the practice under | r Ex parte Quayle, 1935 C.D | . 11. 453 O.G. 213. | | | | |
| Disposition of Claims | , , | | | | | |
| 4)⊠ Claim(s) <u>1-16</u> is/are pending in the application | nn. | | | | | |
| 4a) Of the above claim(s) is/are withdrawn from consideration. | | | | | | |
| 5) Claim(s) is/are allowed. | | | | | | |
| 6)⊠ Claim(s) <u>1-16</u> is/are rejected. | • | | | | | |
| 7) Claim(s) is/are objected to. | | | | | | |
| 8) Claim(s) are subject to restriction and | /or election requirement | | | | | |
| , | ror oldonon requirement. | • | | | | |
| Application Papers | • | | | | | |
| 9) The specification is objected to by the Examir | | | | | | |
| 10) The drawing(s) filed on is/are: a) ac | cepted or b) objected to b | y the Examiner. | | | | |
| Applicant may not request that any objection to th | e drawing(s) be held in abeyand | ce. See 37 CFR 1.85(a). | | | | |
| Replacement drawing sheet(s) including the corre | ction is required if the drawing(s | s) is objected to. See 37 CFR 1.121(d). | | | | |
| 11) The oath or declaration is objected to by the E | Examiner. Note the attached | Office Action or form PTO-152. | | | | |
| Priority under 35 U.S.C. § 119 | | | | | | |
| 12) ☐ Acknowledgment is made of a claim for foreig a) ☐ All b) ☐ Some * c) ☐ None of: 1. ☐ Certified copies of the priority documents. | | 119(a)-(d) or (f). | | | | |
| The state of the priority document | | | | | | |
| j | nts have been received in Ap | plication No | | | | |
| 3. ☐ Copies of the certified copies of the pri- application from the International Burea | only documents have been r | eceived in this National Stage | | | | |
| * See the attached detailed Office action for a lis | | a a a is sa d | | | | |
| and an analysis and an | to the certified copies flot in | eceived, | | | | |
| | | · | | | | |
| Attachment(s) | _ | | | | | |
| Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) | 4) La Interview Su | mmary (PTO-413) Mail Date | | | | |
| Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08 Paper No(s)/Mail Date | 5) Notice of Infe 6) Other: | Mail Date Drmal Patent Application (PTO-152) | | | | |
| J.S. Patent and Trademark Office PTOL-326 (Rev. 1-04) Office A | action Summary | Part of Paper No /Mail Date 100104 | | | | |

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1) It is noted that this application appears to claim subject matter disclosed in prior Application No. 09/152897, filed 9-14-98. A reference to the prior application must be inserted as the first sentence of the specification of this application or in an application data sheet (37 CFR 1.76), if applicant intends to rely on the filing date of the prior application under 35 U.S.C. 119(e) or 120. See 37 CFR 1.78(a). For benefit claims under 35 U.S.C. 120, the reference must include the relationship (i.e., continuation, divisional, or continuation-in-part) of all nonprovisional applications. Also, the current status of all nonprovisional parent applications referenced should be included.

If the application is a utility or plant application filed under 35 U.S.C. 111(a) on or after November 29, 2000, the specific reference to the prior application must be submitted during the pendency of the application and within the later of four months from the actual filing date of the application or sixteen months from the filing date of the prior application. If the application is a utility or plant application which entered the national stage from an international application filed on or after November 29, 2000, after compliance with 35 U.S.C. 371, the specific reference must be submitted during the pendency of the application and within the later of four months from the date on which the national stage commenced under 35 U.S.C. 371(b) or (f) or sixteen months from the filing date of the prior application. See 37 CFR 1.78(a)(2)(ii) and (a)(5)(ii). This time period is not extendable and a failure to submit the reference required by 35 U.S.C. 119(e) and/or 120, where applicable, within this time period is considered a waiver of any benefit of such prior application(s) under 35 U.S.C. 119(e), 120, 121 and 365(c). A priority claim filed after the required time period may be accepted if it is accompanied by

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a grantable petition to accept an unintentionally delayed claim for priority under 35 U.S.C. 119(e), 120, 121 and 365(c). The petition must be accompanied by (1) the reference required by 35 U.S.C. 120 or 119(e) and 37 CFR 1.78(a)(2) or (a)(5) to the prior application (unless previously submitted), (2) a surcharge under 37 CFR 1.17(t), and (3) a statement that the entire delay between the date the claim was due under 37 CFR 1.78(a)(2) or (a)(5) and the date the claim was filed was unintentional. The Director may require additional information where there is a question whether the delay was unintentional. The petition should be addressed to: Mail Stop Petition, Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

- 2) The disclosure is objected to because of the following informalities:
- (A) The specification describes this application as being a Continuation-In-Part of copending application serial No. 09/632,187 which was filed on August 3, 2000. However, this application is not a continuation-in part of application 09/632,187 filed 8-3-00 now US Patent 6634464 entitled "ELEVATOR POSITION INDICATOR DISPLAY SYSTEM AND METHOD OF DRIVING THE DISPLAY". The inventor of US 6634464 is "Steven Troyen" instead of --Frederick Bernhardt--. It appears that this application is a CIP of 09/152897 filed 9-14-98 and that correction of the benefit claim requires the above noted petition. See MPEP 201.11, last thirteen lines of section V, page 200-64, Rev. 2, May 2004.
- (B) The disclosure refers to figure 6. This application contains seven sheets of drawings (instead of six as indicated on the transmittal letter filed 2-21-02). These seven drawing sheets include figures 1, 2, 3, 4, 5A, 5B, 5C but not "figure 6". Since figure 6 is unnecessary for an understanding of the method of manufacture for the liner sock device of figure 4, the following changes are suggested:
 - (a) on page six delete lines 16-18,
 - (b) on page 15 lines 22-23 (last two lines), change "Referring To Fig. 6, an exemplary method of manufacturing the liner sock of Fig. 4 is illustrated." to --An exemplary method of manufacturing the liner sock of Fig. 4 is explained below:--, and (c) on page 16 delete (i) --95-- (line 4), (ii) --96-- (line 4), and (iii) --97-- (lines 7, 8, 17).
 - (C) On page 13 line 6, Fig. 5C" should be --Fig. 5B--.

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Appropriate correction is required.

- 3) The drawings are objected to because In figure 5B, "89" (unattached assembly) in Step 6 should be --90-- (attached assembly). The assembly is attached in step 5. See page 13 lines 14-18. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.
- 4) The oath or declaration is defective. A new oath or declaration in compliance with 37 CFR 1.67(a) identifying this application by application number and filing date is required. See MPEP §§ 602.01 and 602.02.

The oath or declaration is defective because:

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The declaration claims benefit to application "09/632,187" having a filing date of August 03, 2000". However, application 09/632,187 filed 8-3-00 now US Patent 6634464 has no relation to this application.

- The following is a quotation of the second paragraph of 35 U.S.C. 112:

 The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 6) Claims 1-16 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, there is no antecedent basis for "said first internal sock element". In claim 1, line 3, it is suggested to change "an internal sock element" to --a first internal sock element--.

In claim 8, there is no antecedent basis for "said close toe". In claim 8 next to last line, it is suggested to change "said close tow" to --said closed toe--.

In claim 9, it is unclear if the patch is attached before or after the step of forming the aperture.

In claim 11, it is unclear if the patch is attached before or after the step of forming the aperture.

In claim 16, there is no antecedent basis for "said tri-block copolymer". It is suggested to change the dependency of claim 16 from "claim 8" to --claim 15--.

- 7) The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and

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the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

claims 8-16

8) Claims 8-9 and 14-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kania (US 6406499) in view of Lohmann (US 5728167) and/or German '070 (DE 19531070).

Kania directed to **gel and cushioning devices** describes making <u>various articles</u> such as a cushion liner, cushion locking liner, open ended knee or elbow sleeve, cushion fabric and cushion flat sheet. See col. 1 lines 8-12. Kania teaches that the cushion liner may comprise <u>gel</u> (elastomer) with fabric on the inside and/or outside thereof. See col. 1 lines 9-10. The gel (elastomer) may have a durometer Shore A of 0-20. See col. 5 lines 48-49. The gel (elastomer) is a polymeric material such as Kraton rubbers in triblock or diblock form. As a specific example, Kania describes using styrene-ethylene/butylene-styrene copolymers or styrene-ethylene/propylene-styrene copolymers. See col. 12 lines 9-10. In figure 5, Kania illustrates a cushion liner having a closed end and an open end. The elastomer may be applied to the fabric by <u>dipping</u> the fabric in molten elastomer. See col. 13 lines 35-67. In example 1, a "stump sock" is made by <u>dipping</u> an inverted sock made from knit fabric in molten elastomer. Kania does not recite creating an aperture through the closed end of the liner.

As to claim 8, it would have been obvious to one of ordinary skill in the art to create an aperture through the closed end of the liner after the fabric sock has been dipped in molten elastomer so as to create a liner sock since (1) Lohmann, also directed to a sock for providing cushioning (col. 1 lines 19-20, col. 3 lines 57-61), suggests

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creating an aperture in a closed end of a sock such that a locking stud can pass therethrough and so that the sock may be used with a socket sleeve having a locking stud for providing excellent vertical suspension force for a prosthetic limb (col. 3 lines 6-10, 35-37) and/or (2) German '070 suggests forming an opening in a closed end of stump sock (see figures and abstract).

As to claim 9, it would have been obvious to attach a reinforcing patch as claimed in view of Kania's teaching to attach reinforcing material to the interior and/or exterior distal end of the cushioning device. See for example col. 11 lines 36-60. The suggestion to form an opening through the liner comes from the secondary art (Lohmann and / or German '070).

As to claim 14, it would have been obvious to coat 50-100% of Kania's sock in view of Kania's suggestion to coat the sock with gel so as to form cushioning material for increasing the comfort of the wearer.

As to claims 15 and 16, Kania teaches using an elastomer in triblock form. See col. 12 lines 5-14.

9) Claim 13 is are rejected under 35 U.S.C. 103(a) as being unpatentable over Kania in view of Lohmann and/or German '070 as applied above and further in view of Hart et al (US 4218779).

As to claim 13, it would have been obvious to dip the interior of Kania's sock since (1) Kania suggests coating the <u>inside</u> of the fabric with the gel (elastomer), (2) Kania suggests coating the <u>outside</u> of the fabric with gel (elastomer) and (3) Hart et al teaches providing an elastomer coating on <u>the inside and outside</u> of a fabric (of a

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glove) by <u>dipping</u> the fabric in elastomer, turning the fabric inside out and then <u>dipping</u> the fabric, which has been turned inside out into elastomer.

10) Claims 10 and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kania in view of Lohmann and/or German '070 as applied above and further in view of Williams (US 5,483,703).

As to claims 10-12, it would have been obvious to provide a second sock element over the dipped sock and heat so as to bond the second sock to the elastomer since (1) Kania suggests forming the liner such that fabric is arranged on the interior side and the exterior side of the elastomer (gel) and (2) Williams, directed to the sock art, teaches obtaining a sock having fabric arranged on the exterior and interior sides of an elastomeric layer by arranging a fabric layer over the elastomer - first fabric layer to form a preassembly and then heating the preassembly, which includes the elastomer, to activate adhesive and thereby bond the layers together. Claim 10 reads on and fails to exclude the use of a separate heat activated adhesive.

Claims 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kania in view of Lohmann and/or German '070 and further in view of Williams as applied above and further in view of Lerman '010 (US 4832010) and Lerman '626 (US 4635626).

As to clam 12, it would have been obvious to directly connect the open top of the first sock fabric with the external sock fabric since it is well known / conventional in the art of cushioning devices to sew and thereby directly connect layers at an open end of the cushioning device so as to provide a finished edge as evidenced by Lerman '010

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and Lerman '626. See stitching 24 in figure 2 and example col. 3 lines 46-49 in Lerman '010. See stitching 24 in figure 3 of Lerman '626.

claims 1-7

12) Claims 1 and 5-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kania in view of Williams, Lerman '010 and Lerman '626.

Kania is discussed above.

As to claims 1 and 5-7, it would have been obvious to provide a second sock element over the dipped sock and heat so as to bond the second sock to the elastomer since (1) Kania suggests forming the liner such that fabric is arranged on the interior side and the exterior side of the elastomer (gel) and (2) Williams, directed to the sock art, teaches obtaining a sock having fabric arranged on the exterior and interior sides of an elastomeric layer by arranging a fabric layer over the elastomer - first fabric layer to form a preassembly and then heating the preassembly, which includes the elastomer, to activate adhesive and thereby bond the layers together. Claim 1 reads on and fails to exclude the use of a separate heat activated adhesive.

Furthermore, it would have been obvious to join the open top of the first sock fabric with the external sock fabric since it is well known / conventional in the art of cushioning devices to sew and thereby directly connect layers at an open end of the cushioning device so as to provide a finished edge as evidenced by Lerman '010 and Lerman '626. See stitching 24 in figure 2 and col. 3 lines 46-49 in Lerman '010. See stitching 24 in figure 3 of Lerman '626.

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As to claim 5, it would have been obvious to coat 50-100% of Kania's sock in view of Kania's suggestion to coat the sock with gel so as to form cushioning material for increasing the comfort of the wearer.

As to claims 6 and 7, Kania teaches using an elastomer in triblock form. See col. 12 lines 5-14.

Claims 2-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kania in view of Williams, Lerman '010 and Lerman '626 as applied above and further in view of Lohmann (US 5728167) and/or German '070 (DE 19531070).

As to claim 2, it would have been obvious to one of ordinary skill in the art to create an aperture through the closed end of the liner after the fabric sock has been dipped in molten elastomer so as to create a liner sock since (1) Lohmann, also directed to a sock for providing cushioning (col. 1 lines 19-20, col. 3 lines 57-61), suggests creating an aperture in a closed end of a sock such that a locking stud can pass therethrough and so that the sock may be used with a socket sleeve having a locking stud for providing excellent vertical suspension force for a prosthetic limb (col. 3 lines 6-10, 35-37) and/or (2) German '070 suggests forming an opening in a closed end of stump sock (see figures and abstract).

As to claims 3 and 4, it would have been obvious to attach a reinforcing patch as claimed in view of Kania's teaching to attach reinforcing material to the interior and/or exterior distal end of the cushioning device. See for example col. 11 lines 36-60. The suggestion to form an opening through the liner comes from the secondary art (Lohmann and / or German '070).

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Remarks

- 14) The remaining references are of interest.
- 15) No claim is allowed.
- Any inquiry concerning this communication or earlier communications from the examiner should be directed to Steven D. Maki whose telephone number is (571) 272-1221. The examiner can normally be reached on Mon. Fri. 7:30 AM 4:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Blaine Copenheaver can be reached on (571) 272-1156. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Steven D. Maki October 1, 2004 STEVEN D. MAKI RIMARY EXAMINER

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